

REPORT BY THE
AUDITOR GENERAL
OF CALIFORNIA

**THE DEPARTMENT OF HEALTH SERVICES'
INVOLVEMENT IN THE CLEANUP OF
HAZARDOUS WASTE SITES**

REPORT BY THE
OFFICE OF THE AUDITOR GENERAL

P-565

THE DEPARTMENT OF HEALTH SERVICES' INVOLVEMENT
IN THE CLEANUP OF HAZARDOUS WASTE SITES

AUGUST 1985



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STATE OF CALIFORNIA
Office of the Auditor General

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Thomas W. Hayes
Auditor General

August 20, 1985

P-565

Honorable Art Agnos, Chairman
Members, Joint Legislative
Audit Committee
State Capitol, Room 3151
Sacramento, California 95814

Dear Mr. Chairman and Members:

The Office of the Auditor General presents its report concerning the Department of Health Services' involvement in the cleanup of 125 hazardous waste sites. For some of the sites, we could not verify the department's involvement in each phase of the cleanup process or the quantity of hazardous waste cleaned up.

Respectfully submitted,

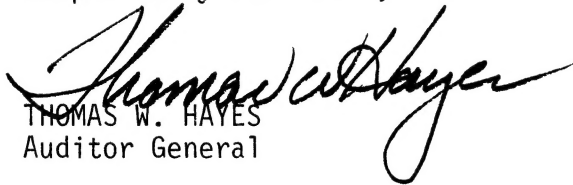

THOMAS W. HAYES
Auditor General

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SUMMARY

Between March 1980 and April 1985, the Department of Health Services (department) was involved in the cleanup of 125 hazardous waste sites. The department had primary responsibility for ensuring the cleanup of 97 hazardous waste sites, and it shared the cleanup responsibility with other governmental agencies for 25 other sites. Records documenting the extent of the department's involvement in 3 sites were not available.

We reviewed the four phases involved in the cleanup of each hazardous waste site. The four phases include requiring the cleanup, reviewing, and approving cleanup plans, monitoring the cleanup, and confirming the cleanup. Based on a review of the department's records, we verified that the department required the cleanup of 96 of the 125 hazardous waste sites, reviewed and approved the cleanup plans for 78 sites, and monitored the progress of site owners in cleaning up 93 hazardous waste sites. We also verified that the department confirmed the cleanup of 86 of the total of 125 sites.

In addition, we found that the department did not accurately report the quantities of hazardous waste cleaned up at 55 of the 125 sites. The department correctly reported the quantities of hazardous waste cleaned up at 51 of the 125 sites. Records were not available to verify the amount of hazardous waste cleaned up at 19 sites.

We could not always verify either the department's involvement in each phase of the cleanup process or the amount of waste cleaned up because the department did not have uniform procedures for documenting the cleanup of hazardous waste sites. On May 14, 1985, the department issued new procedures that require the department's staff to document its activities in each phase of cleaning up a hazardous waste site.

INTRODUCTION

Each year, California produces millions of tons of hazardous waste. These wastes include acids, corrosives, and toxic chemicals like arsenic and PCBs that are generated from industry, agriculture, and mining processes. If mishandled, these wastes threaten the health and safety of the public as well as the environment. Recognizing the need for the safe handling and disposal of hazardous waste in California, the Legislature established a hazardous waste management program to ensure the safe handling, storage, treatment, and disposal of hazardous waste. The Legislature designated the Department of Health Services (department) to administer the program.

Program Administration

In 1981, the department created the Toxic Substances Control Division to continue the implementation and enforcement of the California hazardous waste management program. This division, which has its headquarters in Sacramento, has three regional offices, one each in Emeryville, Los Angeles, and Sacramento. The division conducts its field inspection and enforcement activities from the regional offices.

In fiscal year 1985-86, the Legislature authorized a budget of approximately \$85.4 million for the department's hazardous waste management program. Most of the funding for this program comes from

fees collected from operators of hazardous waste disposal facilities and haulers of hazardous waste and from taxes collected from facilities that generate hazardous waste. The fees and taxes are paid to the Hazardous Waste Control Account and the Hazardous Substance Account of the General Fund. The federal government also provides funds to support the program.

In June 1985, the department's Audits and Investigations Division issued a report on the Toxic Substances Control Division's accomplishments in cleaning up hazardous waste sites. The report indicated that the division had cleaned up over 100 sites between March 1980 and April 1985 and recommended that the division improve its documentation for cleaning up these sites. The division did not verify the accuracy of the quantities of hazardous waste cleaned up.

The department reported that, as of August 15, 1985, it is in the process of cleaning up more than 100 hazardous waste sites for which it has either primary cleanup responsibility or shares the responsibility with other governmental agencies. These sites do not include emergency cleanups of hazardous waste.

Previous Auditor General Reports
on California's Hazardous
Waste Management Program

In October 1981, the Auditor General reported on the State's hazardous waste management program.* The report stated that, since 1978, the department had issued permits to only 18 of the estimated 1,200 hazardous waste facilities then operating in the State, had not effectively enforced hazardous waste control laws, and had not effectively controlled the transportation of hazardous waste. The report concluded that, as a result of these weaknesses, neither the public nor the environment was sufficiently protected from the harmful effects of hazardous waste.

In November 1983, the Auditor General issued a follow-up report on the State's hazardous waste program.** This report concluded that the department had been slow in implementing legislative requirements to issue permits to facilities that handle hazardous waste, to enforce hazardous waste laws, and to monitor the transportation of hazardous waste.

*This report is entitled "California's Hazardous Waste Management Program Does Not Fully Protect the Public From the Harmful Effects of Hazardous Waste," Report P-053, October 1981.

**This report is entitled "The State's Hazardous Waste Management Program: Some Improvements, But More Needs to Be Done," Report P-343, November 1983.

SCOPE AND METHODOLOGY

The purpose of this review was to verify the department's involvement in the cleanup of hazardous waste sites. We sought to verify the department's activities in completing site cleanups by using the list of hazardous waste sites issued in June 1985 by the department's Audits and Investigations Division. This list of sites includes the quantities of hazardous waste cleaned up at each of the sites.

To verify the level of the department's involvement in the cleanup of hazardous waste sites, we visited the three regional offices in Emeryville, Los Angeles, and Sacramento and the branch office in Fresno. We reviewed the records of the regional offices for each hazardous waste site listed in the Audits and Investigations Division report. However, we did not review the records for emergency cleanups.

In our review of the department's records, we attempted to verify both the department's responsibility in cleaning up the site and the quantities of hazardous waste cleaned up. In addition, we determined whether the department required the cleanup, approved the cleanup plans, monitored the progress of the cleanup, and confirmed the cleanup of the site. We accepted only written documentation to verify the department's participation in the cleanup. However, records documenting the extent of the department's involvement in each site cleanup were not always available.

We also collected other information regarding the hazardous waste cleanup from the department's records. We recorded the means the department used to identify the site, the date the department initiated the action to clean up the site, and the date the cleanup was completed. In addition, we noted the participation of other governmental agencies in the cleanup of the hazardous waste sites. In the appendices at the end of the report, we summarize our findings for each cleanup site that the department was involved in.

We were unable to determine the amount of time that the department's staff spent in the cleanup process for each site. Also, we could not determine the department's costs for cleaning up the sites. Department officials stated that the department did not have a system to record either the time spent on each cleanup or the costs incurred to ensure that the cleanup of the hazardous waste sites was accomplished.

To determine the actions taken by the department to improve its documentation of cleanup sites, we interviewed department staff at the regional offices and at the headquarters office. We also reviewed the pertinent department directives distributed to the regional offices.

AUDIT RESULTS

VERIFICATION OF THE DEPARTMENT OF HEALTH SERVICES' INVOLVEMENT IN THE CLEANUP OF HAZARDOUS WASTE SITES

Between March 1980 and April 1985, the Department of Health Services (department) was involved in the cleanup of 125 hazardous waste sites. The department had the primary responsibility for ensuring the cleanup of 97 hazardous waste sites, and it shared the cleanup responsibility with other governmental agencies for 25 other sites. Records documenting the extent of the department's involvement in 3 sites were not available. We found that the department did not accurately report the quantities of hazardous waste cleaned up at 55 of the 125 sites. We could not always verify the department's involvement in each phase of the cleanup because the department did not have uniform procedures for documenting its involvement in the cleanup process. On May 14, 1985, the department issued procedures requiring its staff to document its activities related to cleaning up hazardous waste sites.

We Could Not Always Verify the Department's Involvement in Each Phase of the Cleanup Process

In our review of the department's records, we attempted to verify the extent of the department's involvement in each phase of the cleanup of the 125 hazardous waste sites. The four phases we reviewed

included requiring the cleanup, reviewing and approving cleanup plans, monitoring the cleanup, and confirming the cleanup. Table 1, below, summarizes the results of our efforts to verify the department's involvement in the cleanup of the 125 sites for which it either had primary responsibility or shared responsibility with other agencies. We did not include in the table the 3 sites whose records we could not locate.

TABLE 1
**VERIFICATION OF THE DEPARTMENT'S INVOLVEMENT
IN EACH PHASE OF THE CLEANUP PROCESS
AT HAZARDOUS WASTE SITES**

<u>Cleanup Phase</u>	<u>The 97 Sites for Which The Department Had Primary Responsibility</u>		<u>The 25 Sites for Which The Department Shared Responsibility</u>		<u>Total</u>	
	<u>Verified</u>	<u>Not Verified</u>	<u>Verified</u>	<u>Not Verified</u>	<u>Verified</u>	<u>Not Verified</u>
Required the Cleanup	85	12	11	14	96	26
Reviewed and Approved the Cleanup Plans	68	29	10	15	78	44
Monitored the Cleanup	77	20	16	9	93	29
Confirmed the Cleanup	68	29	18	7	86	36

We verified that the department required the cleanup of 85 of the 97 hazardous waste sites for which the department had primary responsibility. We could not verify that the department required the cleanup of 12 sites because the information was not available in the department's records. The department identified the sites to be cleaned up through a variety of methods. For example, the department

identified 29 sites as a result of its inspections of the sites. Twenty-two sites were identified through citizen complaints, 15 sites were identified when site owners requested the department's assistance in cleaning up the site, and 23 sites were identified through referrals from other governmental agencies such as cities and county health departments. In one case, the department identified a hazardous waste site in Sonoma County because a referral from the California Regional Water Quality Control Board alerted the department to the problem. Acting on this referral, the department required the site owner to remove 40 cubic yards of soil contaminated with glue, phenol, and formaldehyde.

We verified that the department reviewed and approved the site owners' cleanup plans for 68 of the 97 sites for which the department had primary responsibility. There were no records available to verify that the department reviewed and approved the cleanup plans for 29 hazardous waste sites. Generally, the site owners develop the plans for cleaning up hazardous waste sites and indicate whether the waste will be removed from the site or treated at the site. The plans also include a description of the waste, the quantities of waste to be cleaned up, and the method of transporting the hazardous waste to an approved disposal site. The plan may include the method of testing the site to ensure that the hazardous waste has been effectively cleaned up. For example, an aviation service facility submitted a plan to use trained personnel in protective clothing to remove from a Sacramento site three to six inches of soil that had been contaminated with

pesticides. The department reviewed and approved this plan. The department also approved the owner's plan to test the site after the cleanup to ensure that the contaminated soil had been removed.

We verified that the department monitored the progress of site owners in cleaning up 77 sites for which it had primary responsibility. We could not verify that the department monitored the cleanup at 20 sites because the department did not document its monitoring efforts. The department uses various methods to monitor the cleanup of hazardous waste sites, including inspecting the sites, collecting and analyzing samples of contaminated materials before and during the cleanup, and coordinating the activities of interested parties to ensure an orderly cleanup of the site.

We verified that the department confirmed the cleanup of 68 hazardous waste sites for which it had primary responsibility. There were no records available to verify that the department had confirmed the cleanup at 29 sites. The department uses several methods to confirm that hazardous waste sites have been cleaned up. The department may inspect a site after the cleanup has been completed to determine if the hazardous waste was removed. The department also may collect samples of soil and other materials after the cleanup has been completed and submit the samples to a laboratory for chemical analysis to determine if the soil or other materials are within legal toxicity limits. For example, the department confirmed that a salvage company site in Alameda County was cleaned up by inspecting the site during the

removal of the 2,027 drums of chemical wastes and 409 cubic yards of contaminated soil. The department also collected soil samples after the contaminated soil had been removed and obtained a chemical analysis of the soil samples. After reviewing the results of the chemical analysis, the department confirmed that the site was cleaned up.

In Appendix A, we list the 97 hazardous waste sites for which the department had primary responsibility, note the extent to which the department was involved in each phase of the cleanup process, and indicate the quantities of hazardous waste cleaned up at each site.

Based on our review of the department's records, we verified that the department shared the responsibility for ensuring the cleanup of another 25 hazardous waste sites with other governmental agencies such as cities, county health departments, state agencies, and the federal Environmental Protection Agency. For these sites, the department and other agencies worked together to ensure that the hazardous waste sites were cleaned up. For example, if the hazardous waste site affected ground water, the California Regional Water Quality Control Boards were responsible for protecting the ground water, and the department was responsible for ensuring the removal of the hazardous waste.

As Table 1 indicates, we verified that the department required the cleanup of 11 sites for which it shared the cleanup responsibility with other governmental agencies. Also, we verified that the

department reviewed and approved the cleanup plans for 10 sites, monitored the progress of site owners in the cleanup of 16 sites, and confirmed that the cleanup was accomplished at 18 sites.

In Appendix B, we list the 25 hazardous waste sites for which the department shared cleanup responsibility with other governmental agencies, note the extent to which the department was involved in each phase of the cleanup process, and indicate the quantities of hazardous waste cleaned up at each site.

We Could Not Always Verify the Quantities That the Department Reported

We found that the department did not accurately report the quantities of hazardous waste cleaned up at 55 of the 125 sites. We determined the amount of hazardous waste cleaned up by examining such documents as the cleanup reports prepared by the owner's consulting engineers or the transportation "manifest," a required statement describing the type, amount, composition, and origin of waste that was moved from one site to another.

We found that, for 34 sites, the department reported the cleanup of a smaller quantity of hazardous waste than had actually been cleaned up. For example, the department reported that a manufacturing site in Alameda County removed 485 gallons of oil waste and 13 cubic yards of waste contaminated with asbestos and PCBs. Our review of the department's records disclosed that, in fact, the owner disposed of

24,840 gallons and 13 cubic yards of hazardous waste. At a manufacturing site in Orange County, we found that the owner removed 2,350 cubic yards of contaminated soil and 79,000 gallons of water contaminated with solvents. The department correctly reported that 2,350 cubic yards were removed, but it incorrectly reported that 5,600 gallons were removed.

Conversely, we found that for 21 sites, the department reported the cleanup of larger quantities of hazardous waste than had actually been cleaned up. For example, the department reported that the owner of a manufacturing firm removed 12,000 cubic yards of soil contaminated with heavy metals from a site in San Francisco. However, we found that only 10,200 cubic yards of waste had been removed from this site.

The department's regional officials explained that these discrepancies occurred because the quantities reported by the department were only estimates. They stated that they did not have time to review the cleanup records and to calculate quantities accurately.

For 51 sites, we verified that the department correctly reported the amount of hazardous waste that had been removed from the site. For the remaining 19 sites, there were no records available to verify the quantities of hazardous waste that the department reported as cleaned up. For example, the department reported the removal of

1,000 cubic yards of soil contaminated with heavy metal from a site in Tulare County. However, we could not find the documentation to support the removal of this soil.

Verification Was Hampered By the
Department's Poor Documentation
of Its Involvement In Site Cleanups

We could not always verify the department's involvement in each phase of the cleanup process because the department did not have uniform procedures to completely document its participation in the cleanup of hazardous waste sites. The regional officials stated that their primary concern was cleaning up the hazardous waste sites. Because the department did not have procedures requiring the uniform documentation of its cleanup activities, the department does not have accurate records of the cleanup of hazardous waste sites.

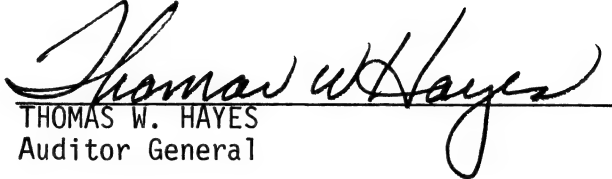
In June 1985, the department's Audits and Investigations Division reviewed the department's cleanup activities and found that they were poorly documented and that cleanup information varied widely among regions. On May 14, 1985, the department implemented procedures that require the staff at each regional office to document the department's activities in cleaning up hazardous waste sites. Furthermore, the department developed a standard reporting form that the staff at each regional office are to use to summarize their cleanup activities.

CONCLUSION

Between March 1980 and April 1985, the Department of Health Services was involved in the cleanup of 125 hazardous waste sites. The department had primary responsibility for ensuring the cleanup of 97 sites; for 25 other sites the department shared the cleanup responsibility with other governmental agencies. Records documenting the extent of the department's involvement in 3 sites were not available. For 55 of the 125 sites, the department did not accurately report quantities of hazardous waste that were cleaned up. Furthermore, we could not always verify the department's involvement in all phases of the cleanup process because the department did not always document its participation in the cleanup of each site. On May 14, 1985, the department issued new procedures that require its staff to document the department's involvement in each cleanup of a hazardous waste site.

We conducted this review under the authority vested in the Auditor General by Section 10500 et seq. of the California Government Code and according to generally accepted governmental auditing standards. We limited our review to those areas specified in the audit scope section of this report.

Respectfully submitted,


THOMAS W. HAYES
Auditor General

Date: August 16, 1985

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DEPARTMENT OF HEALTH SERVICES

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August 15, 1985

Thomas W. Hayes
Auditor General
660 J Street, Suite 300
Sacramento, CA 95814

Dear Mr. Hayes:

Secretary Swoap has asked me to respond to your letter transmitting the report entitled "The Department of Health Services' Involvement in the Cleanup of Hazardous Waste Sites."

The report confirms the Department's initial position regarding its involvement in the cleanup of various hazardous waste sites. The report did point out, as did the Audits and Investigations Division (A&I) report, that lack of uniform documentation was the key problem in verifying the nature of department involvement in site cleanups. However, we are confident that, with the documentation and reporting system required by Rich Wilcoxon's May 14, 1985 memo, documentation will not pose future problems.

Your report states that a larger quantity of waste was removed than was noted in the Regional Office files. On page 12 of your report, it is noted that A&I "...did not accurately report the quantities of hazardous waste cleaned up at 55 sites." The A&I scope of review did not include verification of quantities of waste removed. My staff did not intend to conduct the type and degree of review that your staff did relative to verifying the quantity of waste removed. To avoid any misunderstanding or misinterpretation on this point, I would appreciate it if you would specify that verification of the quantity of waste removed was not within the scope of the Department's internal review.*

The Secretary and I are pleased with the information in your report and wish to thank your staff for their courteous and professional behavior in working with Department of Health Services staff.

Sincerely,

A handwritten signature in dark ink, appearing to read "Ken Kizer", is written over a faint, larger signature.

Kenneth W. Kizer, M.D., M.P.H.
Director

cc: David B. Swoap, Secretary
Health and Welfare Agency

* Auditor General Comment: Text changed on pages 2 and 12.

**HAZARDOUS WASTE SITES FOR WHICH
THE DEPARTMENT OF HEALTH SERVICES
WAS PRIMARILY RESPONSIBLE FOR ENSURING CLEANUP**

Name of Site	How Did the Department Identify the Site?	When Was the Department Involved in the Cleanup?	Did the Department Order the Cleanup?	Did the Department Review and Approve the Plans?	Did the Department Monitor the Cleanup?	Did the Department Confirm the Cleanup?	Description of Waste and Quantity	Did the Department Accurately Report the Quantities of Waste Cleaned Up?
<u>Emeryville Region</u>								
2222 Limited	Citizen complaint	07/80 - 07/84	Yes	Yes	Yes	Yes	10,200 cubic yards of soil	No - Reported more
Agnews State Hospital	Inspection	06/83 - 06/85	No data	No data	No data	Yes	228 gallons; 5 cubic yards of soil	No - Reported less
Alameda Chemical & Scientific (Stiles Paint)	Citizen complaint	09/84 - 01/85	Yes	Yes	Yes	Yes	323 cubic yards of soil; 300 gallons of fluids	No - Reported less
Associated Aerospace Activities	Inspection	03/81 - 09/81	Yes	Yes	Yes	Yes	41.5 cubic yards of soil	No - Reported less
Berman Steel	Citizen complaint	05/81-No data	Yes	No data	Yes	No data	18,000 gallons of oil; 20 cubic yards of soil	No data
Berwind Railroad Service	Citizen complaint	06/83-No data	No data	No data	No data	No data	Unspecified amount of waste	No data
Bio-Rad Laboratories	Governmental referral	1980 - 03/84	Yes	Yes	Yes	Yes	2,400 cubic yards of soil	Yes
Borden Chemical	Governmental referral	03/82 - 03/84	Yes	Yes	Yes	No data	6,100 gallons of liquids; 350 drums; 8 cubic yards of soil	No - Reported less
C & D Batteries	Other	12/82 - 01/85	Yes	Yes	Yes	Yes	13 cubic yards of soil	Yes
California Circuit Engineering	Inspection	07/83 - 08/84	Yes	Yes	No data	No data	7,410 gallons of waste; 10,280 pounds of soil	No - Reported less
California Microwave	No data	No data	No data	Yes	Yes	No data	No hazardous waste removed because waste was classified as nonhazardous	Yes

Name of Site	How Did the Department Identify the Site?	When Was the Department Involved in the Cleanup?	Did the Department Order the Cleanup?	Did the Department Review and Approve the Plans?	Did the Department Monitor the Cleanup?	Did the Department Confirm the Cleanup?	Description of Waste and Quantity	Did the Department Accurately Report the Quantities of Waste Cleaned Up?
Centix Homes of California	Report by owner	09/81 - 09/84	Yes	Yes	Yes	Yes	500 cubic yards of soil	Yes
Certainteed Richmond	Report by owner	1977 - 06/85	Yes	Yes	Yes	No data	10,000 gallons of oil; 1,480 drums; 100 cubic yards of sludge	No - Reported less
Certainteed Santa Clara	Report by owner	03/82-No data	Yes	Yes	Yes	Yes	3,342 cubic yards of soil; 2 transformers	No - Reported more
Colgate-Palmolive	Inspection	08/84 - 03/85	Yes	Yes	Yes	No data	24,840 gallons of liquid; 13 cubic yards of solid waste	No - Reported less
Consolidated Iron Works	Inspection	01/82-No data	Yes	No data	Yes	Yes	7 drums of waste	Yes
IT San Jose	Governmental referral	03/83-No data	Yes	No data	Yes	No data	35 drums of waste	Yes
Dover Sales	Citizen complaint	07/83 - 01/84	Yes	Yes	Yes	Yes	26 cubic yards of soil	Yes
Dura-Bond Bearing	Inspection	12/82 - 11/83	Yes	Yes	Yes	Yes	36 cubic yards of sludge	Yes
E.I. Dupont De Nemours	Report by owner	06/82 - 01/83	Yes	Yes	Yes	Yes	1,680 tons of waste	No - Reported less
El Camino Crop Supply	Governmental referral	10/82-No data	Yes	No data	Yes	No data	15 cubic yards of soil	No data
Esprit De Corp.	Report by owner	12/80-No data	No data	No data	Yes	No data	253 cubic yards of material	No - Reported more
Hard Chrome Engineering	Citizen complaint	07/84 - 10/84	Yes	No data	Yes	No data	15 gallons of soil	Yes
Holland Oil	Inspection	07/84 - 01/85	No data	Yes	Yes	Yes	51,090 gallons of water and oil; 160 cubic yards of soil	No - Reported more
Imperial West Chemical	Inspection	07/82 - 09/82	Yes	Yes	No data	No data	794 cubic yards of soil	No - Reported less

Name of Site	How Did the Department Identify the Site?	When Was the Department Involved in the Cleanup?	Did the Department Order the Cleanup?	Did the Department Review and Approve the Plans?	Did the Department Monitor the Cleanup?	Did the Department Confirm the Cleanup?	Description of Waste and Quantity	Did the Department Accurately Report the Quantities of Waste Cleaned Up?
K & S Management	Citizen complaint	06/83 - 01/84	Yes	No data	Yes	Yes	Unspecified amount of waste	Yes
Laher Spring & Electric Car	Citizen complaint	08/82 - 09/83	Yes	Yes	Yes	Yes	20 cubic yards of waste; 1 drum of solvent	Yes
LGM Manufacturing	Citizen complaint	02/83 - 01/84	Yes	Yes	Yes	Yes	6 drums of waste; 220 gallons of soil	No - Reported more
Major Salvage	Inspection	12/82 - 08/84	Yes	Yes	Yes	Yes	2,027 drums of waste; 409 cubic yards of materials	No - Reported more
Metten and Gebhardt	Inspection	10/81 - 03/84	Yes	No data	Yes	Yes	4,890 gallons of waste; 11 cubic yards of waste	No - Reported less
MRI Timmet	No data	05/78 - 10/83	Yes	Yes	Yes	Yes	8,000 cubic yards of soil	Yes
Peerless Electric	Report by owner	11/83-No data	Yes	Yes	No data	Yes	100 cubic yards of soil	Yes
Peterbilt Motors	Inspection	04/82 - 12/83	Yes	Yes	Yes	No data	222,711 gallons of liquid; 1,242 cubic yards soil	Yes
Pittsburgh-Des Moines	Inspection	03/82 - 04/82	Yes	Yes	No data	Yes	530 gallons and 1,322 cubic yards of waste and sludge; 170 drums	Yes
Shadow Ridge	Governmental referral	07/82 - 04/85	Yes	Yes	Yes	Yes	100 cubic yards of soil	No - Reported more
Spartan Plating	Citizen complaint	12/83 - 12/84	Yes	No data	Yes	No data	1,500 gallons of waste	Yes
Standard Structure	Governmental referral	12/82 - 05/83	Yes	Yes	No data	No data	40 cubic yards of soil	No - Reported less
Tri-Marine	Governmental referral	01/83 - 11/83	Yes	No data	No data	No data	Encapsulation of unspecified amount of soil	Yes

Name of Site	How Did the Department Identify the Site?	When Was the Department Involved in the Cleanup?	Did the Department Order the Cleanup?	Did the Department Review and Approve the Plans?	Did the Department Monitor the Cleanup?	Did the Department Confirm the Cleanup?	Description of Waste and Quantity	Did the Department Accurately Report the Quantities of Waste Cleaned Up?
Ultra Chem	Report by owner	02/83-No data	Yes	Yes	No data	No data	5,250 gallons of solvents	Yes
Union Carbide Pittsburg	Governmental referral	11/83 - 06/84	Yes	Yes	Yes	Yes	48 cubic yards of sludge	Yes
Wedeman Ranch (Heim Bros.)	Inspection	05/83 - 07/83	Yes	Yes	No data	Yes	5 cubic yards of waste	Yes
West Coast Circuits	Inspection	06/82 - 09/83	Yes	Yes	Yes	Yes	3,190 gallons of waste	No - Reported less
Western Grinding Services	Governmental referral	01/80 - 03/84	Yes	Yes	Yes	Yes	148 cubic yards of soil	Yes
<u>Los Angeles Region</u>								
Carrasco Vacuum Truck Service	Inspection	11/83 - 05/84	Yes	Yes	Yes	Yes	20 cubic yards of soil	No - Reported more
Digitran	Report by owner	09/82 - 06/84	No data	Yes	Yes	Yes	60 cubic yards of soil	Yes
Dyer Plating	Governmental referral	06/83 - 11/83	Yes	Yes	Yes	Yes	208 cubic yards of soil	No - Reported less
Erb & Gray Scientific	Governmental referral	06/84 - 09/84	Yes	No data	Yes	Yes	22 drums of chemicals	No - Reported more
Huntington Medical Plaza	Report by owner	No data-09/84	Yes	Yes	No data	Yes	600 cubic yards of soil	Yes
Itasco	Governmental referral	12/82 - 10/83	Yes	No data	Yes	Yes	294 tons of soil	No - Reported less
J. L. Manta	Citizen complaint	09/80 - 03/81	Yes	Yes	Yes	Yes	860 cubic yards of soil	Yes
Kellogg Terrace	Governmental referral	10/80 - 11/81	Yes	Yes	Yes	Yes	9,200 cubic yards of waste	Yes

Name of Site	How Did the Department Identify the Site?	When Was the Department Involved in the Cleanup?	Did the Department Order the Cleanup?	Did the Department Review and Approve the Plans?	Did the Department Monitor the Cleanup?	Did the Department Confirm the Cleanup?	Description of Waste and Quantity	Did the Department Accurately Report the Quantities of Waste Cleaned Up?
Llano Barrels	Citizen complaint	12/80 - 06/83	Yes	Yes	Yes	Yes	1,198 cubic yards of soil; 21 drums of waste	No - Reported more
Magnum Resources	Inspection	12/82 - 02/83	Yes	No data	Yes	Yes	1.89 tons of waste	No - Reported more
Mobil	Inspection	01/79 - 03/85	Yes	Yes	Yes	Yes	40,000 gallons of liquid; 52 cubic yards of soil	No - Reported less
Park Metal	Inspection	10/83 - 09/84	Yes	Yes	Yes	Yes	300 tons of soil, liquid, and metal	No data
Plessey Precision	Report by owner	10/83 - 09/84	Yes	Yes	Yes	Yes	1,700 cubic yards of soil	Yes
Rheem Metals	Citizen complaint	04/82 - 12/82	Yes	Yes	Yes	Yes	50 cubic yards of soil	Yes
Techalloy Western	Inspection	01/82-No data	Yes	Yes	Yes	No data	2,000 gallons of sludge; 29 crushed drums	No - Reported more
Union Carbide Torrance	Report by owner	12/79 - 12/82	No data	Yes	Yes	Yes	52,007 tons of soil; 6 drums of waste	No - Reported less
Universal Propulsion	Citizen complaint	04/83 - 01/84	Yes	Yes	Yes	Yes	353 tons of solid waste	No - Reported less
Valley Plating	Governmental referral	03/84 - 09/84	Yes	Yes	Yes	Yes	100 cubic yards of material	No data
<u>Sacramento Region</u>								
16th Street Plating	Governmental referral	07/81 - 11/84	Yes	Yes	Yes	Yes	100 cubic yards of soil	No data
B & J Manufacturing	Citizen complaint	03/83 - 03/84	Yes	No data	Yes	Yes	7 cubic yards of sludge	No - Reported more
Banta Petroleum	Inspection	09/83 - 03/85	Yes	Yes	Yes	Yes	120 cubic yards of soil	No - Reported less

Name of Site	How Did the Department Identify the Site?	When Was the Department Involved in the Cleanup?	Did the Department Order the Cleanup?	Did the Department Review and Approve the Plans?	Did the Department Monitor the Cleanup?	Did the Department Confirm the Cleanup?	Description of Waste and Quantity	Did the Department Accurately Report the Quantities of Waste Cleaned Up?
Chevron Chemical Fresno	Governmental referral	07/84 - 08/84	Yes	Yes	Yes	Yes	950 cubic yards of soil; 229,100 gallons of waste-water	No - Reported less
Chevron U.S.A.	No data	No data-04/83	Yes	No data	Yes	No data	Unspecified amount of soil	Yes
Cletus Rogers	Citizen complaint	03/81 - 01/84	Yes	Yes	Yes	No data	120 gallons of oil; 3 transformers	Yes
Cooper Property	Governmental referral	08/81 - 09/84	Yes	Yes	Yes	Yes	24 cubic yards of soil	No - Reported less
Defense Depot Tracy	Report by owner	12/82 - 12/82	Yes	No data	Yes	Yes	5.5 tons of soil	Yes
Delta Trucking	Citizen complaint	05/80-No data	No data	No data	Yes	No data	10-15 gallons of liquid	No data
Elias Property	No data	07/83-No data	Yes	Yes	Yes	No data	20 cubic yards of bricks and soil	Yes
ESS Laboratory	Citizen complaint	01/79 - 05/84	Yes	No data	Yes	Yes	1,400 gallons of solvents	Yes
Fonts Property	Inspection	03/83 - 12/84	Yes	Yes	Yes	Yes	66 cubic yards of soil	No data
Genstar Cement & Lime	Inspection	10/84 - 01/85	Yes	Yes	No data	No data	30 cubic yards of soil; 20 empty drums	No data
Golden West Homes (GPM)	Report by owner	04/84 - 10/84	Yes	Yes	Yes	No data	500 drums of sludge and solvents	Yes
Hailey Flying Service	Governmental referral	01/81 - 01/82	No data	No data	Yes	Yes	Unspecified amount of waste	Yes
Helena Chemical	Citizen complaint	04/82 - 09/83	Yes	Yes	Yes	Yes	1,000 cubic yards of soil	Yes
Intercircuits	Report by owner	11/84-No data	Yes	Yes	No data	Yes	40' x 40' concrete and soil	Yes

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Interstate Battery	Citizen complaint	02/81 - 06/83	Yes	Yes	Yes	Yes	3.5 drums of waste; unspecified amount of soil	No - Reported less
IT Kelseyville	Governmental referral	09/78 - 04/85	Yes	No data	Yes	Yes	18 cubic yards of soil	Yes
J.R. Simplot Lathrop	Inspection	04/83 - 06/83	Yes	No data	No data	Yes	51 cubic yards of soil	No - Reported less
Jensen Flying Services	Governmental referral	06/83 - 08/84	Yes	Yes	Yes	Yes	1,300 pounds of waste; 6 cubic yards of soil	Yes
Johnson Control	No data	12/84 - 12/84	No data	No data	No data	Yes	30 cubic yards of soil	Yes
Martinez Property	No data	07/83-No Data	Yes	Yes	Yes	No data	40 cubic yards of bricks and soil	No data
Morse Property/ Gallo Glass (Morris Property)	Governmental referral	03/83-No data	Yes	Yes	Yes	No data	76 cubic yards of bricks and soil	No - Reported less
Namolco	Inspection	07/83 - 12/83	Yes	No data	Yes	Yes	10 gallons of soil	No - Reported more
Naval Communications Station Stockton	Report by owner	04/83 - 02/84	No data	Yes	No data	Yes	307 tons of waste	No - Reported less
Oxychem	Governmental referral	10/82 - 06/84	Yes	Yes	Yes	Yes	350 cubic yards of soil	Yes
PG&E Service Center	Citizen complaint	02/84 - 10/84	Yes	Yes	No data	No data	1,200 cubic yards of materials	Yes
Palm Iron Works	Citizen complaint	04/83 - 02/85	Yes	Yes	Yes	Yes	1,000 cubic yards of materials	No - Reported more
Prestolite Battery	Inspection	04/82 - 02/84	Yes	Yes	Yes	Yes	1,220 cubic yards of soil	No - Reported more

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Sacramento County Executive Airport	Inspection	02/83 - 03/83	Yes	No data	No data	Yes	855 gallons of oils and solvents	No - Reported more
Union Chemical	Inspection	03/83 - 06/83	Yes	No data	Yes	Yes	25 cubic yards of soil	Yes
Valley Construction	No data	No data-03/84	No data	No data	No data	No data	362 cubic yards of soil and bricks	Yes
Vendo	Inspection	04/83 - 03/84	Yes	Yes	Yes	Yes	5,100 gallons of waste-water; 886 cubic yards of soil	No - Reported more
Western Farm Service	Inspection	08/84 - 08/84	Yes	No data	No data	No data	50 cubic yards of soil	No data
Wilbur Ellis	Governmental referral	01/82 - 09/83	Yes	Yes	Yes	Yes	406 tons of soil	No - Reported less

**HAZARDOUS WASTE SITES FOR WHICH
THE DEPARTMENT OF HEALTH SERVICES
SHARED THE CLEANUP RESPONSIBILITY
WITH OTHER GOVERNMENTAL AGENCIES**

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<u>Berkeley Region</u>								
E.I. Dupont De Nemours	Report by owner	03/84 - 06/85	Yes	Yes	Yes	Yes	18,000 cubic yards of material; 3,363 tons of soil	No - Reported less
GTE Lenkurt	Inspection	12/81 - 03/84	Yes	Yes	Yes	Yes	4,132 gallons of liquid; 22 cubic yards of waste	No - Reported less
Homart Development	No data	1982 - 11/83	Yes	Yes	Yes	Yes	Unspecified amount of contaminated soil	Yes
ICT	Governmental referral	02/83 - 01/84	No data	No data	Yes	Yes	2.5 drums of waste	No - Reported less
Lawrence Livermore National Laboratory	No data	No data-09/84	No data	No data	Yes	No data	11,000 cubic yards of soil; 200 capacitors	No data
Port of San Francisco	Governmental referral	05/82-No data	Yes	Yes	Yes	No data	Several hundred drums of waste	Yes
Santa Clara County Jail	Citizen complaint	07/83 - 09/83	No data	No data	No data	Yes	3 small spots of PCB	Yes
U.S. Navy (U.S. Navy Regional Hospital)	Citizen complaint	06/84-No data	Yes	Yes	Yes	No data	452 cubic yards of soil; 500 gallons of liquid	No - Reported less
<u>Los Angeles Region</u>								
Audio Magnetics	Report by owner	1983 - 02/84	No data	No data	No data	Yes	79,000 gallons of liquid; 2,350 cubic yards of soil	No - Reported less
Bolsa Chica Disposal Site	Report by owner	1979 - 07/81	Yes	Yes	Yes	Yes	60,000 cubic yards of soil	Yes

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CerLainteed Riverside	Governmental referral	06/83 - 02/84	Yes	Yes	Yes	Yes	80 cubic yards of soil	Yes
El Monte Disposal Service	Governmental referral	12/82 - 04/83	Yes	Yes	Yes	Yes	118 cubic yards of sludge	No - Reported less
General Disposal	Governmental referral	1979 - 09/81	Yes	No data	Yes	Yes	15,000 drums of solvents	Yes
Johns Manville	Citizen complaint	11/83 - 05/84	No data	No data	No data	No data	250 cubic yards of soil	No data
Orchid Paper Products	Citizen complaint	12/83 - 12/83	Yes	No data	Yes	Yes	28 drums of solvents; unspecified amount of soil	No - Reported less
Ryan Airport	Governmental referral	03/84 - 11/84	No data	Yes	No data	Yes	1,000 cubic yards of soil	Yes
Simon Plating	Governmental referral	06/84 - 06/84	Yes	No data	Yes	Yes	45 containers of waste; other materials	No - Reported more
Stankevich I	Governmental referral	1981 - 09/84	No data	No data	No data	Yes	300 containers of waste	Yes
Stankevich II	Inspection	04/84 - 09/84	No data	No data	No data	Yes	1,153 containers of waste	No - Reported less
Todd Shipyard	Inspection	No data	No data	No data	Yes	Yes	3,768 tons of materials	No - Reported less
Wadsworth VA Hospital	No data	No data	No data	No data	No data	No data	83 PCB transformers; 20 cubic yards of soil	No data
<u>Sacramento Region</u>								
Ames Road	Governmental referral	04/84 - 05/84	No data	No data	Yes	Yes	500 gallons of liquid; 154 cubic yards of soil	No - Reported more
Banquet Foods	Citizen complaint	08/84-No data	No data	No data	No data	Yes	7 cubic yards of soil; 10 drums of material	No data
Candlewick Yarn	Governmental referral	09/83 - 04/85	No data	No data	Yes	No data	1,000 cubic yards of soil	No data
City of Bakersfield	Other	09/83 - 03/84	No data	Yes	No data	No data	2,180 cubic yards of soil	No - Reported more

cc: Members of the Legislature
Office of the Governor
Office of the Lieutenant Governor
State Controller
Legislative Analyst
Assembly Office of Research
Senate Office of Research
Assembly Majority/Minority Consultants
Senate Majority/Minority Consultants
Capitol Press Corps